

## ***Erigeron acris* subsp. *baicalensis* (Asteraceae), a new combination in Asian *Erigeron***

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*Erigeron acris* subsp. *baicalensis* (Asteraceae), a new combination in Asian *Erigeron*. – Acta Mus. Siles. Sci. Natur. 65: 97-100, 2016.

**Abstract:** *Erigeron acris* subsp. *baicalensis* (Botsch.) A. Pliszko is proposed as a new combination for Asian *E. baicalensis* Botsch.

**Key words:** *Erigeron* sect. *Trimorpha*, nomenclature, plant taxonomy, Siberia.

### **Introduction**

*Erigeron baicalensis* Botsch. (Asteraceae) occurs on mountain meadows and steppe slopes in Eastern Russia (eastern and southern Siberia) and northern Mongolia (Botschantzev 1959, FloraGREIF 2010+). It belongs to *Erigeron* sect. *Trimorpha* (Cass.) DC. which consists of perennial, biennial or annual herbs with three types of flowers in each capitulum, i.e. outer female ray flowers with filiform lamina, inner female ray flowers without lamina and inner bisexual disc flowers (Šída 1998, Nesom 2008). According to Botschantzev (1959) and Šída (1998), *E. baicalensis* is morphologically very similar to Eurasian *E. podolicus* Besser, however, it can be distinguished from the latter species by less numerous cauline leaves, less numerous and larger capitula, as well as by shorter peduncles. Moreover, both species do not overlap in geographical distribution (Botschantzev 1959). Considering that *E. podolicus* and several other closely related European and Eurasian taxa of *Erigeron* sect. *Trimorpha* are currently treated as the subspecies of *E. acris* L. (Greuter 2003, 2006+, Greuter & Raab-Straube 2005), I assumed that there is a need to transfer *E. baicalensis* at subspecies rank to *E. acris*. The recognition of subspecies within the *E. acris* complex is based on the fact that its members are morphologically very similar to each other, and they are more or less geographically isolated (Halliday 1976, Greuter 2003, 2006+, Pliszko 2015).

### **Material and methods**

Morphological characters of *Erigeron baicalensis* were critically revised based on nine scanned herbarium sheets of specimens deposited in LE, including the type specimens (Fig. 1–2), and compared with the data from the literature (Botschantzev 1959, Šída 1998).

### **Results and Discussion**

*Erigeron acris* subsp. *baicalensis* (Botsch.) A. Pliszko, **comb. nov.**  $\equiv$  *Erigeron baicalensis* Botsch. in Shishkin, Fl. SSSR 25: 584. 1959. – Holotype: Russia, Zabaykalsky Krai, Nerchinsk Mountain District (near Kluczevskoje, Bolschoi Kadaluj), 6 Aug 1911, *V. Smirnov* 4989 (LE! 01015465; isotype LE! 01015466).

*Additional specimens examined:* Russia. Southern Siberia, western shore of Lake Baikal, between 53°N and 55°N, 9 Jul 1928, *V.N. Sukachev* s.n. (LE! 01017362); eastern Siberia, Sakha (Yakutia) Republic, left bank of the Aldan River, 534 km from the estuary of the Maya River, 9 Aug 1928, *G. Melvil* s.n. (LE! 01017363); eastern Siberia, Sakha (Yakutia) Republic, Lena River valley, 8 Jul 1912, *G. I. Dolenko* s.n. (LE! 01017364); Buryat Republic, 1931, ? (LE! 01017365); Buryat Republic, Upper Angara river basin, 5 Aug 1912, *V.N. Sukachev* & *G. Pop-*

*lavskaya s.n.* (LE! 01017366); Zabaykalsky Krai, Nerchinsk, *Turchaninov s.n.* (LE! 01017367); Zabaykalsky Krai, Chita, left bank of the Ingoda River, 1923 (LE! 01017368).

*Erigeron acris* s. l. is considered to be a morphologically variable taxon, especially in indumentum, number of cauline leaves and arrangement of capitula (Halliday 1976, Pliszko 2015). The aforementioned features are important in taxonomy of *Erigeron* sect. *Trimorpha* (Šída 1998, Pliszko 2015). Morphological characters of the examined specimens of *E. baicalensis*, in my opinion, reflect the variability of *E. acris* under the level of subspecies. *Erigeron baicalensis* is similar in leaf shape to *E. podolicus* and *E. acris* s. str. but differs in having larger capitula. It resembles *E. podolicus* and *E. acris* s. str. in its indumentum as it is a plant densely covered by unbranched non-glandular trichomes on its stems, leaves and involucre bracts. Therefore, *E. acris* subsp. *baicalensis* is proposed as a new combination for better understanding the variability of *E. acris* s. l. In this respect, it is worth mentioning that Huber & Leuchtmann (1992), Huber & Nilsson (1995), Noyes (2000) and Jafari *et al.* (2015) demonstrated the close genetic affinity between many European, Eurasian and Asian taxa of *Erigeron* sect. *Trimorpha*.

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Fig 1: Holotype of *Erigeron baicalensis* deposited in LE.





**Fig 2:** Isotype of *Erigeron baicalensis* deposited in LE